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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/840,982	04/25/2001	Gerd Hugo	24580	5343
20529	7590	05/01/2007		
NATH & ASSOCIATES 112 South West Street Alexandria, VA 22314			EXAMINER BRUNSMAN, DAVID M	
			ART UNIT	PAPER NUMBER
			1755	
			MAIL DATE	DELIVERY MODE
			05/01/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 09/840,982	Applicant(s) HUGO, GERD	
	Examiner David M. Brunzman	Art Unit 1755	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 27 November 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1,2,5,7-11,13-16 and 18 is/are pending in the application.
- 4a) Of the above claim(s) 8-11,13-16 and 18 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1,2,5 and 7 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☒ Claim(s) 1,2,5,7-11,13-16,18 are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

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Applicant's response filed 27 November 2006 has been carefully considered. Applicant's election with traverse of the species having a binder of emulsions of acrylates, a first pigment being the combination of "Red 33" and copper phthalocyanine and, the second pigment is stainless steel flakes is acknowledged. The scope of examination has been expanded to include all species wherein the binder is emulsions of acrylates, the first pigment includes *a phthalocyanine dye* and, the second pigment is steel flakes. This scope is consistent with the scope of the search required to examine the elected species. Applicant argues a serious burden on the office would not be present to examine all of the claimed species. This is not found persuasive. As pointed out in the requirement, the examination of all species would entail search of hundreds of subclasses and consideration of tens of thousands of documents.

The requirement is still deemed proper and is therefore made FINAL.

Claims 1, 2, 5, 7-11, 13-16 and 18 are pending. Claims 8-11 and 18 are noted by applicant as withdrawn (non-elected species). Claims 13-16 are similarly withdrawn from consideration a directed to further mixtures of pigments not part of the elected species. Claims 1, 2, 5 and 7 are pending.

Comparison of the components of the instant invention to the prior art is complicated by the use of terms such as "first pigment" and "second pigment", etc. in both the instant claims and the prior art. For purposes of clarity, the examiner has relabeled the components to be compared as "(A)"-the binder in the instant claims, "(B)"-first pigment in the instant claims and, "(C)"- the second pigment in the instant claims.

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

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(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1, 2, 5 and 7 are rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent 6017981. (US Patents 6692824, 3577379, 5962143, 5840364, 5540998 and 5405680 are cited to help establish the level of ordinary skill in the art)

The reference teaches a coating composition comprising a binder having transmission in the thermal infrared range greater than 40% that may be an aqueous dispersion (emulsion) based on various acrylates. See column 4, lines 4-8. Column 2, lines 51-55 teach that the near IR absorbency of the patent composition is due to the particles of component (B) and the following discussion of tinting particles indicates that the composition remains substantially transparent to visible light, overlapping the 40-60% transmission indicated by the instant claims.

Component (B)- the second particle of the reference and the first pigment of the instant claims-may be selected from phthalocyanines (see, column 3, line 65). It would have been obvious to one of ordinary skill in the art to select pigments based on their known transmission and absorbency characteristics at particular wavelengths to affect the transmission and absorbency characteristics of a coating composition as a whole because the prior art as a whole clearly teaches that it is within the level of ordinary skill in the art to select these components based on their individual spectral selectivity to make a coating composition having an expected composite of the spectral properties of the components. US 6017981 as a whole and particularly the passages relied upon clearly establish that such selection based on the characteristics falls within the level of ordinary skill in the art. US 6692824 (this patent was published as EP 0548822 on 30 June 1993), 3577379, 5962143, 5840364, 5540998 and 5405680 further establish

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the level of ordinary skill in the art in that they each exemplify the selection of particular components having known spectral characteristics combined to produce a composition having a composite of those individual characteristics. Simplified, if one selects a pigment that absorbs near IR radiation, a second pigment that absorbs UV radiation and a third pigment that reflects visible light, one of ordinary skill in the art would expect that the resulting combination of the three in a coating composition would produce a coating that absorbs IR radiation, absorbs UV radiation and reflects visible light.

Component (C)-the flakey particle of the prior art and second pigment of the instant claims may be selected from flakey particles of stainless steel to affect reflectivity in the thermal IR range. See column 3, line 17. The formula at column 2, lines 32-33 teaches that the high R required by the prior art would require a high ($\geq 20\%$) transmission in the thermal IR range. As with the selection of component (B), it would have been obvious to one of ordinary skill in the art to select pigments based on their known transmission and reflectancy characteristics at particular wavelengths to affect the transmission and reflectancy characteristics of a coating composition as a whole because the prior art as a whole clearly teaches that it is within the level of ordinary skill in the art to select these components based on their individual spectral selectivity to make a coating composition having an expected composite of the spectral properties of the components. US 6017981 as a whole and particularly the passages relied upon clearly establish that such selection based on the characteristics falls within the level of ordinary skill in the art. US 6692824, 3577379, 5962143, 5840364, 5540998 and 5405680 further establish the level of ordinary skill in the art in that they each exemplify the selection of

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particular components having known spectral characteristics combined to produce a composition having a composite of those individual characteristics.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to David M. Brunzman whose telephone number is 571-272-1365.

The examiner can normally be reached on M, Th, F, Sa; 7:00-5:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jerry Lorengo can be reached on 571-272-1233. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

David M Brunzman
Primary Examiner
Art Unit 1755

DMB

